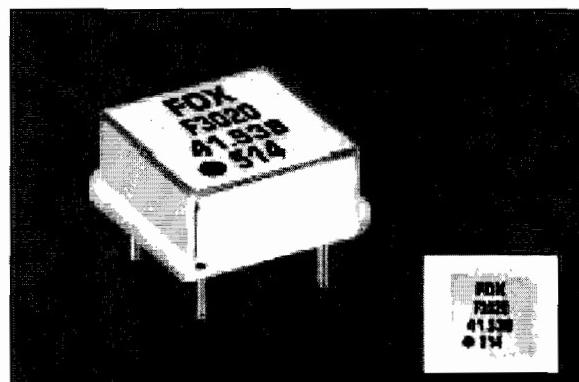


HALF SIZE HCMOS/TTL HEAVY LOAD OSCILLATOR

F3020

The F3020 Clock Oscillator is our half size design capable of driving heavy HCMOS loads. This oscillator has a tri-state enable/disable on pin 1 to facilitate testing with ATE. The package is all metal with pin 4 as case ground which provides shielding to help minimize EMI radiation.



Actual Size



FEATURES

- 8 Pin Dip
- 50pF HCMOS Load to 80 MHz
- 10TTL Fanout
- Tri-state Enable/Disable
- Drives 80486 & 68030
- -40°C to +85°C Available

PART NUMBER SELECTION

Frequency Stability	Part Number
±100PPM	F3020
±50PPM (up to 90MHz)	F3025
±25PPM (up to 50MHz)	F3026

• ELECTRICAL CHARACTERISTICS (Ta = 25°C, VDD = 5.0V, CL = 50pF)

PARAMETERS	FREQUENCY RANGE	CONDITIONS	MIN	MAX	UNITS
Frequency Range (Fo)			1.544	100.000	MHz
Frequency Stability	1.544 ~ 100.000	All Conditions*	-100	+100	PPM
Temperature Range	1.544 ~ 100.000				
Operating (TOPR)			-10	+70	°C
Storage (TSTG)			-55	+125	
Supply Voltage (VDD)	1.544 ~ 100.000		+4.5	+5.5	V
Input Current (IDD)	1.544 ~ 25.000 25.000+ ~ 50.000 50.000+ ~ 80.000 80.000+ ~ 100.000		25 40 77 82		mA
Output Symmetry	1.544 ~ 80.000 80.000+ ~ 100.000	2.5V	45 40	55 60	%
Rise Time (TR)	1.544 ~ 100.000	0.5V ~ 4.5V		5	nS
Fall Time (TF)		4.5V ~ 0.5V		5	
Output Voltage (VOL) (VOH)	1.544 ~ 100.000	IOL = 16 mA IOH = -16 mA		0.5	V
Output Current (IOL) (IOH)	1.544 ~ 100.000	VOL = 0.5 V VOH = 4.5 V		16 -16	mA
Output Load	1.544 ~ 100.000 1.544 ~ 80.000 80.000+ ~ 100.000	TTL HCMOS HCMOS		10 50 30	TTL pF pF
Start-up Time (Ts)	1.544 ~ 100.000			10	mS

* Inclusive of 25°C tolerance, operating temperature range, input voltage change, load change, aging, shock, and vibration.

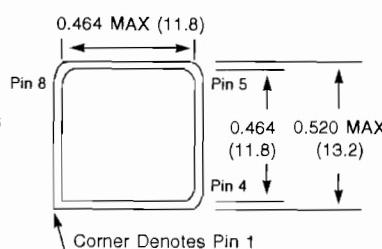
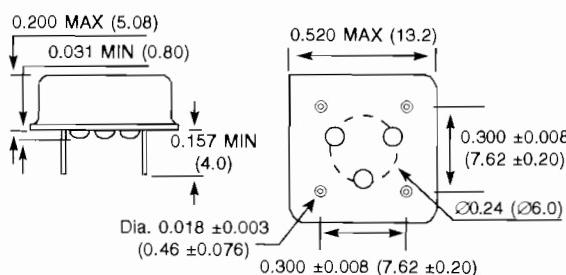
***An internal pullup resistor from pin 1 to pin 8 allows active output if pin 1 is left open.

See page 35 for mechanical specifications, test circuits, and output waveform.

All specifications subject to change without notice. Rev. 5/20/98

• ENABLE / DISABLE FUNCTION**

INH (Pin 1)	OUTPUT (Pin 5)
OPEN ***	ACTIVE
'1' Level VIH ≥ 2.2 V	ACTIVE
'0' Level Vil ≤ 0.8 V	High Z



Inch dimensions shall govern.

All dimensions are in inches & parenthetically in millimeters.